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The University of Pittsburgh

Bulletin 1920 – 1921

School of Dentistry

UNIVERSITY OF PITTSBURGH BULLETIN

THE SCHOOL OF DENTISTRY

1920-1921

ANNOUNCEMENT SERIES

VOL. 16 JULY 10, 1920 NO. 19

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BOARD OF TRUSTEES OF THE UNIVERSITY OF PITTSBURGH FOR 1920-21

(EX OFFICIO)

THE GOVERNOR OF THE COMMONWEALTH OF PENNSYLVANIA
THE MAYOR OF THE CITY OF PITTSBURGH
THE CHANCELLOR OF THE UNIVERSITY

DATE ELECTED		
	Class 1. Term expires June, 1921	
1893	ANDREW WILLIAM MELLON, A.M.	Pittsburgh
1900	JAMES HENRY LOCKHART, A.B.	Pittsburgh
1903	THOMAS HARLAN BAIRD MCKNIGHT	Pittsburgh
1903	THOMAS PATTERSON, A.M.	Pittsburgh
1911	JOHN KNOX MCCLURKIN, D.D.	Pittsburgh
1912	JOHN CRAWFORD WALLACE, PHARM.D.	New Castle
1913	ALFRED REED HAMILTON, B.S.	Pittsburgh
1919	OGDEN MATHIAS EDWARDS, JR., A.B., M.D.	Pittsburgh
1917	WILLIAM LEWIS CLAUSE	Pittsburgh
1917	BENJAMIN GILBERT FOLLANSBEE	Pittsburgh
	Class 2. Term Expires June, 1922.	
1890	BENJAMIN THAW, A. B.	Pittsburgh
	CHAS. WESLEY RIDINGER.	Pittsburgh
1904	WILLIAM LUCIEN SCAIFE, PH.B., C.E.	Pittsburgh
1907	JOSEPH CLIFTON TREES, M.E.	Pittsburgh
1908	WALTHER RIDDLE, PH.D.	Pittsburgh
1909	EDWARD VOSE BARCOCK	Pittsburgh
1914	GEORGE STURGIS OLIVER, A.B.	Pittsburgh
1916	RICHARD BEATTY MELLON	Pittsburgh
1916	GOVERNOR OF PENNSYLVANIA	Harrisburg
1918	GEORGE BREED GORDON	Pittsburgh
	Class 3. Term Expires June, 1923.	
1882	RT. REV. CORTLANDT WHITEHEAD, D.D., LL.D.	Pittsburgh
1889	WILLIAM JACOB HOLLAND, PH.D., LL.D.	Pittsburgh
1902	GEORGE HUBBARD CLAPP, SC.D.	Pittsburgh
1906	HOWARD HEINZ, A.B.	Pittsburgh
1907	ANDREW JACKSON KELLY, JR.	Pittsburgh
1907	SAMUEL ALFRED TAYLOR, C.E., SC.D.	Pittsburgh
1910	WILLIAM PENN SNYDER	Pittsburgh
1914	HENRY CLAY MCELDOWNEY	Pittsburgh

HISTORY

The University of Pittsburgh is the oldest institution of learning with one exception (The University of Nashville), in the United States, west of the Appalachian Mountain range. It came into being as the Pittsburgh Academy in the year 1786, and was formally incorporated by Act of Legislature in February, 1787. It was re-incorporated as the Western University of Pennsylvania in February, 1819. In 1908 the name was changed to University of Pittsburgh. It has educated in whole or in part many thousands of the young men of Western Pennsylvania and adjacent States, and its alumni have filled many of the most distinguished offices in the gift of the Commonwealth and the nation.

The growth of the institution has been rapid in more recent years, and the University is today the most largely attended institution of learning in its class in the State of Pennsylvania, with the single exception of its sister institution—the University of Pennsylvania, located at Philadelphia.

CALENDAR FOR 1920-1921

1920

September 7	Tuesday—Infirmary opens
September 27 . .	Monday—Winter Term begins, 9 A. M.
Christmas recess	from Monday, December 20, to Saturday, January 1, both inclusive
Fall Convocation	Wednesday, September 29

1921

First Semester ends	Saturday, February 5
Second Semester begins	Monday, February 7
Second Semester ends	Saturday, June 11

FACULTY

Samuel Black McCormick, D.D., LL.D., Chancellor.
H. Edmund Friesell, B.S., D.D.S., LL.D., Dean, Professor of Operative Dentistry.
Owen Lovejoy Hertig, A.M., D.D.S., Professor of Dental Pathology and Therapeutics and Operative Clinician.
John Stewart Ashbrook, D.D.S., Professor of Dental Anatomy, Dental Medicine and Comparative Dental Anatomy.
Stewart Leroy McCurdy, A.M., M.D., Professor of Anatomy, Oral and General Surgery.
Clement Russell Jones, M.D., Professor of General Pathology, Materia Medica and Therapeutics.
William Lincoln Fickes, D.D.S., Professor of Dental Ceramics, and Hygiene.
Frederick Charles Friesell, D.D.S., Professor of Histology and Bacteriology.
Albert Floyd Judd, Pharm.D., Professor of Chemistry and Metallurgy.
John Flocker Biddle, D.D.S., Professor of Orthodontia and Radiology.
Robert Zugsmith, D.D.S., Professor of Physiology and Embryology.
Cecil Oliver Booth, D.D.S., Professor of Prosthetic Dentistry.

ASSISTANT PROFESSORS

Lucius Wallace Ohl, D.D.S., Operative Technics, Anesthesia and Exodontia.
Allison Luther Lewis, D.D.S., Crown and Bridgework.
John St. Clair Hipple, D.D.S., Dental History and Rhetoric.
William Andrew Dunn, D.D.S., Chemistry and Metallurgy.
Walter Henry Wright, D.D.S., Anatomy and Clinical Prosthesis.

LECTURERS

Patrick Vincent McParland, D.D.S., Clinical Dentistry and Dental Jurisprudence.
Arthur Bowman French, D.D.S., Operative Technics and Ethics.
Harry Cameron Metz, B.S., D.D.S., Physics and Orthodontia.
Thurlow Weed Brand, B.S., D.D.S., Biology and Technical Drawing.
Roy G. Pearce, A.B., M.D., Physiology.
Alfred Clyde Young, D.D.S., Crown and Bridgework.

DEMONSTRATORS AND ASSISTANTS

Leslie Waddill, D.D.S., Dental Anatomy.
Thomas Zwingli Plank, D.D.S., Crown and Bridgework.
Ord M. Sorber, D.D.S., Clinical Dentistry, Operative Technics.
Leonard Quaill Calihan, D.D.S., Operative Technics, Clinical Dentistry.
William Barr Coulter, D.D.S., Prosthetic Technics.
Albert Edgar Fawcett, D.D.S., Chemistry and Metallurgy.
Frank Oliver Hood, D.D.S., Clinical Dentistry.
Andrew M. Martin, D.D.S., Clinical Dentistry.
Carl Raymon Garman, D.D.S., Clinical Dentistry, Crown and Bridgework.
Joseph S. Matson, D.D.S., Operative Technics and Clinical Dentistry.
Oscar James Reckard, D.D.S., Prosthetic Technics.
Ellsworth E. Eskey, D.D.S., Prosthetic Technics.
Courtney Otto Bischoff, D.D.S., Prosthetic Technics and Crown and Bridgework.
John Bain Sutherland, D.D.S., Crown and Bridgework.
Thomas Milton Taylor, D.D.S., Clinical Prosthetic Dentistry.
George W. Allison, D.D.S., Clinical Dentistry and Prosthetic Technics.
Albert Laurence Bartlett, D.D.S., Clinical Dentistry and Dental Anatomy.
John L. Boots, D.D.S., Clinical Dentistry and Technical Drawing.
Ward W. Eskey, D.D.S., Clinical Dentistry.
John H. Euwer, D.D.S., Clinical Dentistry and Prosthetic Technics.
Albert L. H. Finley, D.D.S., Prosthetic Technics.
Robert F. Fox, D.D.S., Clinical Dentistry.
William James Hutchison, Jr., D.D.S., Biology.
George M. Kiner, D.D.S., Clinical Dentistry.
Carl Henry Muth, D.D.S., Prosthetic Technics.
Charles A. McGuire, D.D.S., Physiology.
Ray Walter Osborne, D.D.S., Clinical Dentistry and Operative Technics.
Lawrence Edward Van Kirk, B.S., D.D.S., Biology.
Bruce P. Rial, D.D.S., Ceramics.
George E. Wright, D.D.S., Clinical Prosthetic Dentistry.
Mabel Stevenson, Laboratory Technician.

GENERAL INFORMATION

The building for the School of Dentistry was erected on the University Campus, and dedicated June 18, 1912. It is perfectly arranged for its special purposes, is devoted entirely to the teaching of dentistry, and has been thoroughly fitted out with the very latest and most improved equipment and teaching appliances.

The extraordinary growth of the School of Dentistry and of the Clinic has made it necessary to provide additional quarters. Plans for a new building were completed during the past winter, but building conditions being found impossible, the Trustees of the University have purchased the building of the Central Athletic Association at the corner of Thackeray and O'Hara Streets (adjoining the University Campus), for the use of the Dental School until such time as it may prove possible to erect a new building.

The newly acquired property will greatly increase clinical facilities, and practically all of the work of the Senior and Junior classes will be conducted therein. The present Dental Building will be used almost entirely for the Freshman and Sophomore classes.

The laboratories are supplied with electric lathes, compressed air, gas and electricity. The infirmary contains the latest model operating chairs, each with fountain cuspidor, electricity, gas and compressed air. Steel operating tables, and steel lockers are provided.

Complete arrangements have been made for the treatment of oral surgery cases, and private rooms have been provided for anæsthesia, extracting, orthodontia, etc.

During the past year more than twenty-five thousand patients were treated in the Infirmary. In addition to this abundant clinic which affords an invaluable experience to the student, outside clinics have been established at the various homes, asylums, and penal institutions of the county, one of which has over twelve hundred inmates, and senior students who show marked ability are assigned to this special work, where they have an exceptional opportunity to gain valuable experience in the personal management of interesting cases.

A candidate for the degree of Doctor of Dental Surgery must have attended four full courses of lectures in some reputable dental college, the last one of which must be in this School. He must be twenty-one years of age, and of good moral character.

REQUIREMENTS FOR ADMISSION

NOTE—The School of Dentistry is a member of the National Association of Dental Faculties, and conforms to all its regulations.

The minimum requirements for admission to the Dental School are a regulation four-year high school course or its equivalent.

All dental students are required by the Pennsylvania State Law to secure Dental Students' Certificates from the Bureau of Professional Education of the State. The Pittsburgh representative of the Bureau is Major C. B. Smathers, Room 101 State Hall, University of Pittsburgh.

Information in regard to the procuring of these certificates may be had by applying to the Dean of the Dental School.

Entrance examinations are held in September, February and June.

Students, to obtain credit for a full term, must be and remain in attendance until the close of the session. A minimum attendance of 85% is required.

Students presenting credentials from reputable schools, medical, scientific or literary, for work done in branches taught in this school, and covering these branches fully or in clearly definite part, will be credited for such work, provided that such credtis shall amount to as much as one-half year.

VACCINATION

The State and City laws require each student in a public educational institution to present to the authorities thereof a certificate of vaccination. A blank form will be furnished each new student to be filled out and filed with the Dean when the student enters school.

ENTRANCE EXAMINATIONS

June 3, 4, and 5. September 1, 2, and 3, 1920.

COMBINED COURSES FOR B.S. AND D.D.S. DEGREES

Students who have completed three years in the College of the University for the Bachelor of Science degree will be given that degree at the end of the freshman year in the School of Dentistry. This enables the student to receive both degrees in seven years, and the three years of College work will be of inestimable value to him in his dental course.

HOW TO REACH THE SCHOOL

From Pittsburgh's business center take any car running out Forbes Street or Fifth Avenue to Boquet Street; the School of Dentistry is located directly north on Boquet Street; or take an East Liberty via Center Avenue car, get off at Aliquippa Street, and walk around the brick roadway, keeping to the left.

BOARD AND LODGING

There are no residence halls for the use of students, but board and lodging may be obtained from private families who live near the School in the Oakland, Bellefield and Herron Avenue districts. Students may apply at the Office of the Housing Committee of the University for a list of approved living quarters.

TELEPHONE AND MAIL ADDRESS

Address all letters regarding catalog, matriculation, entrance requirements, examinations, etc., to the Dean of the School of Dentistry, University of Pittsburgh, Pittsburgh, Pa.

The School of Dentistry is reached through the general University Exchange, Schenley 3300. Private lines to the various departments, including the Dean's office.

COURSES OF INSTRUCTION

FOUR-YEAR COURSE

Freshman Year

	Lecture Hours	Laboratory Hours	Total Hours
Physics	32	64	96
Chemistry and Metallurgy	64	192	256
Biology	64	128	192
Technical Drawing	—	96	96
Dental Anatomy	32	96	128
Prosthesis	32	256	288
		Total -	1056

Sophomore Year

Prosthesis	32	128	160
Anatomy	64	224	288
Physiology	64	80	144
Histology	32	96	128
Organic and Physiological Chemistry	32	96	128
Operative Dentistry	32	160	192
Bacteriology	32	96	128
		Total -	1168

Junior Year

	Lecture Hours	Laboratory Hours	Total Hours
Prosthesis	—	64	64
Materia Medica	32	—	32
Dental Rhetoric	32	—	32
Surgery	16	—	16
General and Dental Pathology	64	112	176
Operative Dentistry	32	288	320
Dental Medicine and Pharmacology	32	32	64
Crown and Bridgework	32	192	224
Orthodontia	32	32	64
Ceramics	32	32	64
Oral Hygiene	16	32	48
		Total -	1104

Senior Year

Prosthesis	—	96	96
Dental Rhetoric	64	—	64
Operative Dentistry	32	640	672
Anesthesia	32	32	64
Oral Surgery	32	64	96
Crown and Bridgework	—	192	192
Orthodontia	—	32	32
Radiology	16	16	32
*Ceramics	32	—	32
Therapeutics	32	—	32
History, Economics, Ethics and Jurisprudence	32	—	32
		Total -	1344

This schedule is subject to change without notice.

*For year 1920-21 only.

DEPARTMENTS OF INSTRUCTION

OPERATIVE DENTISTRY

Professor H. E. Friesell

The principles and practice of Operative Dentistry are taught by the application of systematic procedures to operations in classes, so that a correct judgment may be formed as to their application in particular operations.

The same method of instruction will be applied by clinical instructors, the classes being divided into sections.

Modern and accepted methods will be exemplified.

INSTRUMENTS—Each student, before beginning his work, is required to procure the instruments necessary for his use, a list of which will be furnished Each Junior and Senior student is required to have a dental engine.

OPERATIVE TECHNICS

PROFESSOR H. E. FRIESELL

The object of this course is to familiarize the student with the organs to be operated upon, together with the principles that underlie all operations upon the teeth, and provide a systematic course in manual training.

This course includes: Sectioning of teeth through various surfaces in order to gain a knowledge of the inception and progress of caries; the preparation of cavities of each class in enlarged plaster models; preparing cavities in extracted teeth and celluloid tooth forms, and filling the same with gold; the use of the various forms of gold and other filling materials; opening, enlarging and filling root canals; bleaching, scaling, and as far as possible all operative procedures in detail; instruments and instrumentation.

CLINICAL DENTISTRY

PROFESSOR H. E. FRIESELL

A review of the technical procedures taught in the preceding years will be followed by a course of lectures and recitations covering the whole field of the principles and practice of Operative Dentistry.

The Operative Clinic is open daily from ten to four o'clock throughout the year, except during the months of July and August, and is in charge of the professor and demonstrators of operative and clinical dentistry. The principles learned in the technic course are carried out in the infirmary, and this course is made as much like an actual practice as possible.

CROWN AND BRIDGEWORK

ASSISTANT PROFESSOR LEWIS, DR. ALFRED CLYDE YOUNG

A complete course in crown work, including the preparation of roots and the making of all the acceptable styles of crowns, is covered.

Bridgework, both fixed and removable; the repairing of crowns and bridges, and the whole subject of gold inlays are treated. Baked crowns and porcelain bridges are covered in the department of Ceramics.

DENTAL PATHOLOGY AND THERAPEUTICS

Professor Hertig

Lectures from this chair will comprise instruction in the principles of dental pathology, indication and elements of disease, pathological dentition, pathological eruptions, dental caries and its results, odontalgia, periodontitis, alveolar abscess, necrosis, pyorrhea alveolaris, and all the various diseases of the teeth and associate parts, with the therapeutic agents and materials used in the treatment and correction of the same.

Private operative clinics, covering every practical operation, will be given before the Senior class in sections.

PROSTHETIC DENTISTRY

Professor Booth

The course will cover Prosthetic Technics, followed by the preparation of the mouth for dentures, impressions, methods of constructing various bases, and the treatment of metals and alloys which may be of value in dentistry.

Continuous gum work, artificial vela, methods of making and adjusting appliances for fractures of the maxillæ, will be taught, and exemplified as far as possible by practical work in the clinic.

ANESTHESIA AND EXODONTIA

Assistant Professor Ohl

Anesthesia will be taught by lectures, and by demonstrations in the infirmary; will cover the whole field of local and general anesthetics, the use, complications and dangers of each, and the means of preventing and treating accidents arising from their use.

Particular attention will be given to difficult cases of extraction, impacted teeth, etc., and the treatment of hemorrhage and such other accidents as may accompany extracting. Each student will be required to administer anesthetics, and to extract, under the personal supervision of the teacher of this subject.

DENTAL ANATOMY

Professor Ashbrook

This course will consist of the drawing, modeling and carving of the various teeth, and the study of their surfaces, ridges, fossæ, grooves, etc.

Systematic nomenclature; the importance of the proper contact of approximating teeth; normal occlusion, and the relation of the teeth to the soft tissues receive thorough consideration.

COMPARATIVE DENTAL ANATOMY

PROFESSOR ASHBROOK

In this division of general anatomy the student will be taught comparative anatomy by the study of animal life, beginning with the lowest forms, and leading up to the highest in regular gradation; taking the teeth *seriatim* from the lowest types, and showing their progressive evolution from simple to complex forms, demonstrated by skulls, models, charts and stereopticon.

This subject is a strong factor in emphasizing the importance of the law of occlusion.

DENTAL MEDICINE AND PHARMACOLOGY

PROFESSOR ASHBROOK

This course will cover fully all remedial agents that belong properly to the special field of dental medicine, and will discuss briefly the most important general remedies that may be available in dental diseases and emergencies.

ANATOMY

PROFESSOR MCCURDY

Instruction in this department consists of lectures and demonstrations of the anatomy of the entire body, special lectures being given upon regions of the face, head and neck.

Surgical and Topographical Anatomy of face receives special attention, as the study of the various parts is considered.

PRACTICAL ANATOMY

PROFESSOR MCCURDY, DR. WRIGHT

Students are required to make a complete dissection during the Sophomore year.

To facilitate the study of Anatomy, boxes containing a half skeleton are given the student upon a deposit of $5.00, returnable upon return of box and the contents as it was received.

GENERAL AND ORAL SURGERY

PROFESSOR MCCURDY

The Junior course covers: general principles, including repair; acute infection and the results; surgical fevers; erysipelas; shock; general diagnosis; diseases of the vascular system; asepsis and antisepsis; anesthetics, and principles in operations, wounds and emergencies.

The Senior course includes diseases of the structures of the oral cavity, the antrum and other cavities, diseases and injuries of the gums, alveolar process and tongue; diseases, injuries and neuroses of the face; congenital defects of the face and mouth; diseases of bone; tuberculosis; venereal diseases; diseases of the salivary glands; neuralgia; tumors; ankylosis; fractures; dislocations; general conditions producing oral manifestations, and oral diseases producing general symptoms; plastic surgery, and prosthesis.

Operation in hospitals and clinical cases at the School will give the student an opportunity to make a practical study of cases.

A course in Physical Diagnosis is given in order that graduates of this School may be able to make an intelligent examination of the heart and lungs preparatory to the administration of an anesthetic.

PHYSICS

Dr. Metz

This course will embrace the study of the properties of matter, physical measurements, metric system of measures, volume, mass and density, specific gravity, force and equilibrium, hydraulics, hydrostatics and pneumatics, motion, velocity and acceleration, composition and resolution of forces, Newton's laws, gravitation, work, energy and power, machines, temperature and thermometry, specific heat, effect of heat, sound, radiant energy, electrostatics, electrokinetics, sources, properties and uses of electric currents, dental applications of electricity.

It will include an examination into the physical properties of filling materials, tooth structure, plaster, rubber, steel, porcelain, hand pressure, mallet force, stress of mastication, light and color.

TECHNICAL DRAWING

Dr. Brand

Practice in the use of drawing instruments. Elementary projections, lettering, orthographic, isometric and oblique projections. Reading and making of working plans. Sketching.

It is the aim of this course to teach the student close observation, precision, neatness, delicacy of touch, visualization and the ability to portray what he sees as an aid to study.

CHEMISTRY

Professor Judd

The department of Chemistry includes general and inorganic chemistry, metallurgy, organic chemistry and chemistry of anesthetics. The teaching is by lectures, recitation and laboratory practice, continuous throughout the first two years

GENERAL AND INORGANIC CHEMISTRY

Lectures, recitations and laboratory practice. The course is begun with a brief review of the history of the subject, the scope of the science, and its relation to the other physical sciences and to dentistry, with a consideration of the notation and nomenclature employed in modern chemistry. When this preliminary work has been accomplished, the important elementary substances are taken up in order of their natural classification, and separately lectured upon. Contemporaneous with the lectures, every member of the class receives laboratory practice, which includes the preparation (when possible) of each element in the free state, the study of its leading properties, and of its characteristic reactions. When the elements have all received consideration in this manner the class is given a brief drill in qualitative analysis, with practice in the identification of inorganic chemical substances in simple mixtures.

METALLURGY

Lectures, recitations and laboratory practice. The work is carried on with lectures and recitations from lessons assigned in the text-book. After the general principles of the subject have been reviewed, the manufacture and properties of amalgams and alloys receive consideration, followed by a study of the individual metals and their uses and application in dentistry, with laboratory practice in identification of metals, and in the manufacture and assay of alloys and amalgams.

ORGANIC CHEMISTRY AND CHEMISTRY OF ANESTHETICS

Lectures, recitations and laboratory practice. The lectures and recitations will be devoted to a consideration of the general principles of the chemistry of the Carbon Compounds, their classification and uses. In the laboratory the student is expected to prepare a series of the more important members, and to study their principal reactions and means of identification.

MATERIA MEDICA AND THERAPEUTICS

PROFESSOR JONES

During the early portion of the Junior year special attention will be given to the definition of words and phrases, their derivation and significance, with reference to their use in Materia Medica, Therapeutics and Pharmacy. After this, the most important drugs in general use will be taken up and considered separately, with reference to their physiological effects, doses, methods of administration, their toxic effects, antidotes, etc. The same method of teaching is continued through the course.

GENERAL PATHOLOGY

PROFESSOR JONES

A thorough knowledge of General Pathology is necessary before the more advanced branches or special branches can be properly understood. Hence the object of teaching in this department is to unfold to the student the fundamental principles of the subject, and bring them within his comprehension; also to increase his interest in the study of the subject, to obtain a knowledge of the inception and course of pathological processes, their changes and effects upon the organism as manifested in abnormal conditions.

ORTHODONTIA

PROFESSOR BIDDLE, DR. METZ

Normal occlusion, the etiology and classification of malocclusion, physiology of tooth movement, character of tissues involved, modern methods and appliances for the correction of malposed teeth, and correction as related to the harmony of the facial lines, facial art, are all included in the instruction in this branch.

The technical course consists of free-hand soldering, soldering and adjusting combination appliances, and making of accurate models. The work is illustrated by stereopticon, charts and models, and demonstrated by clinical cases.

DENTAL CERAMICS

PROFESSOR FICKES

Instruction in this course will consist of one lecture each week, supplemented by demonstration, in detail, of practical operative and prosthetic porcelain work.

The more important subjects are: The history and development of the porcelain art; the composition, characteristics and manipulation of porcelain compounds; the source of heat employed; the use and care of furnaces, and descriptions and demonstrations of all the more important methods of inlay, crown and bridge and continuous gum work.

PHYSIOLOGY AND EMBRYOLOGY

PROFESSOR ZUGSMITH, DR. PEARCE

The teaching in this branch will consist of lectures, quizzes and practical demonstrations.

In the lectures it will be the aim of the teaching to keep continually in mind the fact that the normal condition must be understood before the

abnormal can be known. The student will be taught, as far as possible, to form his conclusions from facts of personal observation, and from those given to him by the demonstrations of the professor.

Each structure of the body will be shown, its function and its relation to every other structure. Special attention will be given to the subjects of blood, circulation, digestion and the nervous system, where these are so closely identified with important laws of interest to the dental student.

The lectures will be supplemented by quizzes, and each student will be required to pass an examination in all subjects which have been taught.

Muscle and nerve physiology, production of the voice, central nervous system, brain, spinal cord, reproductive organs, embryology and development are considered.

BIOLOGY

PROFESSOR F. C. FRIESELL

This course includes such consideration of Zoology and Botany as will prepare the student for the subsequent courses in Anatomy, Histology, Physiology and Bacteriology.

It is the plan to establish in the student's mind the principles underlying all structures and functions of living things.

The animal Kingdom is studied in a progressive manner beginning with the single-celled animals and proceeding through the various phyla to the mammalia. The plant Kingdom is studied sufficiently to learn the relation between animals and plants and their interdependence for the elements of nutrition, and also for the early recognition of the position and classification of Bacteria.

Laboratory exercises are coordinated with the lectures so far as practicable in securing material.

Special stress is laid on drawing (during the laboratory courses) as a recognized necessary factor to impress on the memory the details of structure as well as the differential characteristics of the various organisms studied.

Test questions are given each period requiring textbook references for descriptive notes to accompany the drawings.

HISTOLOGY

PROFESSOR F. C. FRIESELL

The course in Histology consists of a systematic presentation of the subject of the minute anatomy of the various parts of the body, partly by lectures, and more especially by the practical study of actual specimens under the microscope. The methods of preparation of microscopical specimens are presented and practiced in the laboratory.

The work in microscopy is preparatory to the subject of Histology, and consists of a course of lectures upon the construction and manipulation of the compound microscope, with practice by the student in preparation of temporary and permanent mounts, including the technique of embedding, sectioning and staining both of hard and soft tissues.

The laboratory is supplied with microscopes and all the apparatus necessary to render the student familiar with the subject of microscopical technique, as well as the normal histology of the various tissues and organs of the body.

DENTAL HISTOLOGY

PROFESSOR F. C. FRIESELL

Lectures on Dental Histology embrace the origin, development, tissues and the functions of the teeth, and the development of the superior and inferior maxillary bones, the dental tissues—enamel, dentine, cementum, peridental membrane, periosteum, the tooth pulp, the other soft tissues of the mouth, and a short course in embryology of the dental structures.

BACTERIOLOGY

PROFESSOR F. C. FRIESELL

(a). The student is taught the principles of General Bacteriology; a knowledge of the preparation of the media for cultivating bacteria; the morphological, biological and physiological attributes.

(b). In oral bacteriology, the subjects of morphology and biology of the micro-organisms of the teeth are carefully considered, together with their relation to caries of the teeth and oral diseases.

PATHOLOGICAL AND BACTERIOLOGICAL LABORATORY

PROFESSOR F. C. FRIESELL

Laboratory work in pathology and bacteriology is carried on. Slides of pathological conditions, including tumors, diseases of the liver, kidneys, lungs, etc., are prepared.

The bacteriological laboratory is equipped with high-power microscopes containing oil-immersion lens, Abbe condenser and iris-diaphragm. It also contains incubator, and moist sterilizers, and every variety of apparatus known to modern bacteriology.

Students are taught rapid staining and mounting of sections, principles of sterilization, method of isolating bacteria, technique of making plates, study of colonies, staining, mounting and examination of the more common varieties of bacteria, with special reference to bacteria found in

the mouth. Opsonins, antitoxins, Widal test for typhoid fever and tests for efficiency of various germicides and antiseptics are practically demonstrated.

RADIOLOGY

PROFESSOR BIDDLE

X-Ray and Electricity, as applied to dentistry, have been added to the list of branches taught in the School. The students will be taught the uses of radiography, and will be given instruction in preparing and developing plates after they are made. The course will cover instruction in electrophysics, electrophysiology and electrotherapeutics, and the control of electricity as a motor power.

JURISPRUDENCE

DR. MCPARLAND

The course of lectures in this branch will cover the subjects of dental witnesses, rights and liabilities of dental practitioners, including the law of crimes, negligence and contracts, as applied to the practice of the profession, together with a discussion of the history of dental legislation in general, and of the statutes in force in Pennsylvania regulating the practice of dentistry.

ORAL HYGIENE

PROFESSOR FICKES

Oral Hygiene embraces a knowledge of the factors and conditions which produce or assist in producing disease, local or general, which arise from perverted function or from unsanitary conditions in the oral cavity, as well as the best means of preventing such diseases.

This course will consist of lectures on all of the most important subjects relating to the prevention of diseases of the oral cavity, and of conditions in the oral cavity which are unfavorable to the general health.

HISTORY

DR. HIPPLE

The course in Dental History will cover the subject from the earliest times to the present, and will include biographies of noted and successful dentists and the factors which led to their success, as well as the record of the development of the art and science of dentistry.

RHETORIC

DR. HIPPLE

The object of this course is to develop the student's analytical and constructive powers in both written and oral English; to teach him to overcome the physical difficulties of public address; to eliminate self-consciousness and to acquire self-confidence; to give him practice in debate and in parliamentary procedure; to develop the reading habit and to cultivate a knowledge of dental literature by using it as a basis for theme writing and theses.

This course is given during the third and fourth years.

ECONOMICS

DR. BOOTH

The course in Dental Economics will embrace the business requirements for success in practice, including selection of a location, arrangement of an office, relations with patients, personal appearance and conduct, general business methods, fees, bookkeeping and records, self-development, etc.

ETHICS

DR. FRENCH

Ethics primarily means conduct considered with reference to its good or bad results to self or to others. The course in Ethics considers, therefore, the dealing of the dentist with patients and the profession; consultations; the necessity of moral, mental and physical cleanliness and honesty in his dealing with his fellowman; unprofessional conduct, etc.

TEXT-BOOKS

(SUBJECT TO CHANGE)

Freshman Year—Physics, Milliken-Gale-Bischof; Dental Anatomy, Black; Biology, Hegner; Dental Prosthesis, Wilson; Chemistry, Smith; Dictionary, Dorland, Stedman or Gould; Histology, Hill; Metallurgy, Hodgen.

Sophomore Year—Prosthesis, Wilson; Anatomy, Gray; Physiology, Pearce; Histology, Hill; Chemistry, Smith; Operative Dentistry, Black; Bacteriology, Pitfield; Dental Histology, Noyes.

Junior Year—Prosthesis, Wilson; Materia Medica, Bastedo; Rhetoric, ————; Oral Hygiene, ————; Operative Dentistry, Black; Oral Surgery, McCurdy; Dental Medicine, Prinz, Buckley; Pathology, McConnell; Dental Pathology, Burchard.

Senior Year—Dental Pathology, Burchard; Orthodontia, ————; Special Dental Pathology, Black; Prosthesis, Wilson; Anesthesia, ———; Rhetoric, ————; Operative Dentistry, Black; Oral Surgery, McCurdy; Radiology, ————.

FEES

Matriculation (required of all new students), $5.00; Annual Tuition Fee, $260.00; Diploma, $10.00.

The tuition may be paid in two installments: $135.00 at the opening of the term in October, and no student is formally entered until such is paid; the remainder on or before January 5th. The amount charged for tuition includes an Athletic Fee and Student's Activities Fee. This entitles students to free admission to the athletic events and the other activities under the control of the General Athletic Committee of the University.

No student is permitted to enter upon final examinations at the close of the term who has not paid his fees for the entire year.

According to the regulations of the School of Dentistry, no fees are returnable. Should the student discontinue his studies, any fee or fees paid will hold good for a subsequent course, but they are not transferable.

REQUIREMENTS FOR ADVANCEMENT IN COURSES

Students are graded on the work of the year as judged by the performance of their duties, including written and oral examination records. Minimum passing grade in examinations, 75 per cent in each subject.

Students who have done satisfactory work for any year will be advanced to the succeeding class.

A student whose work has not been satisfactory, will, according to the judgment of the Faculty:

1. Continue with his class, for a limited time, conditioned in certain subjects,
2. Repeat the year in all branches,
3. Be enrolled as a special student, or
4. Be dropped from the course.

(Rule 4 may be applied at any time during the year.)

See also department rules for removal of conditioned work.

EXAMINATIONS

Examinations are held in the various branches taught, at stated periods during the term and at the close of the year.

Students of the Freshman, Sophomore and Junior classes below 75 in any study will be given the privilege of a second examination before the opening of the next winter term. A student may, however, be admitted to the class in advance if he be conditioned upon not more than two branches; but these conditions must be removed during the first semester. No students will be permitted to enter the second semester with any conditions.

No students will be advanced with conditions in technic work.

A failure in Operative or Prosthetic Dentistry will constitute a failure in the year's work.

GRADUATION

Candidates for the degree of Doctor of Dental Surgery must have attended four full courses of lectures in a recognized dental college, or its equivalent (as required by the rules of the National Association of Dental Faculties), the last of which must have been in this institution. They must be twenty-one years of age and of good moral character, and must bring before the professors of Operative and Prosthetic Dentistry such evidence of proficiency in practical dentistry as may be required.

REGULAR TERM

The regular winter term begins September 27th, 1920, and continues for eight months, or until June 1st, 1921.

Students must matriculate before October 7th to obtain credit for the term.

Students who fail to enter their names on the matriculation book or make application for admission before October 7th may enter upon the payment of $125.00. No time credit can be given upon such attendance.

FALL AND SPRING TERMS

The Infirmary is open from September 1st to July 1st of the following year. During this time patients in abundance are furnished the students for practical work. During the Spring and Fall terms, the Senior and Junior classes have an opportunity to complete their requirements in practical work.

NOTES

Seats and laboratory privileges are assigned in order of matriculation.

The Faculty will be pleased to advise parents, when so desired, of the progress and general conduct of students.

Each student is required to supply himself with the specified outfit for laboratory work in histology and bacteriology.

Grades and cards are withheld from students who have not complied with the rules of the School.

For further information address the Dean of the School of Dentistry.

Re-examinations for conditioned students will be held as follows:

FRESHMAN STUDIES

Prosthesis	2:00 P.M.	Monday,	Sept. 27
Dental Anatomy	9:00 A.M.	Tuesday,	Sept. 28
Technical Drawing	1:00 P.M.	Tuesday,	Sept. 28
Physics	9:00 A.M.	Wednesday,	Sept. 29
Chemistry and Metallurgy	1:00 P.M.	Wednesday,	Sept. 29
Biology	9:00 A.M.	Thursday,	Sept. 30

SOPHOMORE STUDIES

Operative Dentistry	10:00 A.M.	Monday,	Sept. 27
Bacteriology	9:00 A.M.	Tuesday,	Sept. 28
Physiology	9:00 A.M.	Wednesday,	Sept. 29
Chemistry	1:00 P.M.	Wednesday,	Sept. 29
Histology	9:00 A.M.	Thursday,	Sept. 30
Prosthesis	1:00 P.M.	Thursday,	Sept. 30
Anatomy	9:00 A.M.	Friday,	Oct. 1

JUNIOR STUDIES

Materia Medica	10:00 A.M.	Monday,	Sept. 27
Dental Pathology	2:00 P.M.	Monday,	Sept. 27
Dental Rhetoric	9:00 A.M.	Tuesday,	Sept. 28
General Pathology	1:00 P.M.	Tuesday,	Sept. 28
Surgery	9:00 A.M.	Wednesday,	Sept. 29
Operative Dentistry	1:00 P.M.	Wednesday,	Sept. 29
Dental Medicine	9:00 A.M.	Thursday,	Sept. 30
Crown and Bridgework	1:00 P.M.	Thursday,	Sept. 30
Orthodontia	9:00 A.M.	Friday,	Oct. 1

SENIOR CLASS

Amdur, Ben	Pittsburgh
Bauman, Herman H.	Cleveland, O.
Brett, George J.	Clearfield
Crawford, Thomas	Blossburg
Donahue, Raphael A.	New Brunswick, N. J.
Firestone, Louis	McKeesport
Foltz, Victor C.	Mercer
Grinberg, Samuel Aaron	McKeesport
Hantz, George F., Jr.	Greensburg
Highberger, Frederick	Greensburg
Hytowitz, Abram	Pittsburgh
Jones, Fred Gilmore	Wilkinsburg
Kelly, Frank W.	Lake Carey
Kneedler, Alvin Raymond	Greensburg
Lacock, Gideon Smitheman	Pittsburgh
Latimer, William Reid	Oakmont
Lowe, Charles Tracey	Zanesville, O.
Madden, Francis Charles	Ottawa, Ontario, Canada
Miller, Ralph Means	Pittsburgh
Morgan, James Michael	Homestead
McLaren, George Williams	Harrison, N. J.
Nagle, Edmund Burke	Ottawa, Ontario, Canada
Ostrosky, Samuel Leonard	Pittsburgh
Pearlman, Isadore Ralph	Pittsburgh
Pfeifer, Edwin Arthur	Homestead
Rubin, Morris	Pittsburgh
Ryan, Lawrence P.	Syracuse, N. Y.
Schermer, Maurice	Farrell
Schwartz, Howard Maurice	Pittsburgh
Seaman, Harold Charles	Bellevue
Silvis, William Harold	New Bethlehem
Sloan, Henry	Pittsburgh
Spencer, Lyman Wingate	Carbondale
Swanson, William Fredin	Brookston
Watson, John Loomis	St. Marys, W. Va.
Williams, Gordon Maurice	Utahville
Withrow, Ross Bowman	Irwin

JUNIOR CLASS

Aber, Joseph Howard	Dravosburg
Ainsworth, Walter Lewis	Cape Vincent, N. Y.
Bagley, Michael	Carbondale
Baker, Jesse Leroy	Evans City
Barkley, Marion McKinley	Pittsburgh

Barrett, William Henry	Wilmerding
Beck, John Howard	Aspinwall
Benshoff, Harry Mansell, Jr.	Johnstown
Black, Dwight L.	Mars
Bleakley, Samuel Norman	East Brook
Bossart, Robert Neilson	Latrobe
Bovard, James Edward	Kane
Breman, Benjamin	Pittsburgh
Bresnahan, Miss Mary Pauline	McKeesport
Burbridge, Isaac Ralph	Port Vue
Davies, Alfred Robert Rinehart	Pittsburgh
Davis, Charles Reed	McKees Rocks
Edwards, William Henry	Pittsburgh
Fineman, Louis	Pittsburgh
Fitzgerald, John P.	Pittsburgh
Foley, John Joseph	Canonsburg
Freyman, Jacob Edward	Sharon
Gardner, Donald Edward	Pittsburgh
Gordon, Charles	Pittsburgh
Gougler, Roscoe A.	Harrisburg
Hamberger, Thomas Joseph	Lock Haven
Hanna, Walter Sidney	East Sullivan
Healy, Patrick Aloysius	Altoona
Herskowitz, Adolph Edward	Wilkinsburg
Horner, William Wallace	New Castle
Irish, Russell Edwin	Pittsburgh
Johnston, Harold Paul	Monessen
Kerr, Charles Todd	Marienville
Kinsey, Ernest Dewey	Evans City
Koehler, John Jesse	Erie
Komara, Michael Arthur	Johnstown
Kopsofsky, Edward	Braddock
Kratzert, Oscar A.	Woodlawn
Lathrop, Laurence Leslie	Emporium
Latimer, George N.	Youngstown, O.
Lias, John Kenneth	Dayton
MacMath, Walter J.	Homestead
McClure, James Stevenson	Wheeling
McCrory, John	Wilkinsburg
McCulla, George Hamilton	New Castle
McMonigle, David Ralph	Pittsburgh
Major, Samuel Glenn	Avella
Markell, C. Maurice	Monongahela City
Marsh, J. Carey	Brookville
Morgan, James Alvin	North Clairton

Morgart, Sam Matt Friday ..... Roaring Springs
Prigg, Roy Ellwood ..... Washington
Rubin, Leslie ..... Pittsburgh
Ryan, Walter Leo ..... Rensselaer, N. Y.
Saul, Harry ..... Pittsburgh
Saul, Myer ..... Pittsburgh
Silvis, Robert Edison ..... Greensburg
Smith, Claud Jenning ..... Smithton
Stahlman, Solomon Chester ..... Charleroi
Sternberg, Harry H. ..... East Pittsburgh
Stevens, Elmer Joseph ..... Erie
Wertz, Leroy Herbert ..... Aspinwall
Williams, Thomas Darius ..... Juniata
Wilson, Earl Fenwick ..... Pittsburgh
Zuver, Fred Arnold ..... Tionesta

SOPHOMORE CLASS—1919-1920

Adams, Sherwood Merrill ..... Roaring Springs
Amenta, Lawrence Joseph ..... North East
Ardery, Robert Frederick ..... Avalon
Badger, Herman Joel ..... Butler
Baker, Edward Ford ..... Erie
Beerman, Herman P. ..... Johnstown
Bischoff, Walter Daniel ..... Pittsburgh
Bowser, Joseph T. ..... New Bethlehem
Brady, Gerald H. ..... Yonkers, N. Y.
Brickley, Arthur J. ..... Tyrone
Bridges, Harold Metcalfe ..... Youngstown, O.
Brown, Charles G. ..... Pittsburgh
Buchanan, Harold ..... Woodsfield, O.
Chrissey, Willis Stanford ..... South Fork
Crumpton, Robert Imbra ..... Turtle Creek
Curran, Thomas Leo ..... Duquesne
Davidson, Miss Mollie Naomi ..... Pittsburgh
Davidson, Ralph Edwin ..... Hickory
Duve, Justus Donald ..... Pittsburgh
Eagye, Vernon ..... Charleroi
Edwards, Harold William ..... Pittsburgh
Ekker, David Leonard ..... Sharon
Escher, John P. ..... Edgewood
Ewing, Frederick M. ..... Pittsburgh
Ferguson, Joseph Harris ..... Pittsburgh
Frank, Meyer Marcus ..... New Castle
Frost, Harry L. ..... East Liverpool, O.
Gershuny, Saul J. ..... Braddock

GIBBIN, LESLIE A. ..... Springville, N. Y.
GINN, EDGAR ORLO ..... McKeesport
GOTTLIEB, EDWARD R. ..... Turtle Creek
GOTTLIEB, MORTON DAVID ..... Point Pleasant, N. J.
GRAHAME, JACOB BLACK ..... Donora
GREGORY, WILLIAM A. ..... Pittsburgh
GREENE, MAURICE R. ..... Pittsburgh
GREENBERGER, BENJAMIN ..... Aliquippa
GRISSINGER, RAYMOND ..... McConnellsburg
GVATSOVSKY, LOUIS ANDREW ..... Pittsburgh
HALE, EDWARD E. ..... Rochester, N. Y.
HARPER, ALVIN R. ..... Coraopolis
HETNER, FREDERICK F. ..... Greensburg
HILTY, ARTHUR D. ..... Vandergrift
HOFFER, HARRY ..... Winnipeg, Manitoba, Canada
HOOP, THOMAS JEFFERSON ..... New Salem
HUPF, VINCENT M. ..... Johnstown
ITSCOITZ, LOUIS ELDER ..... McKeesport
JAMIESON, ANNA ELLIOTT ..... Pittsburgh
JOHNSON, NORMAN ..... Wilkinsburg
KARAPASZ, JOSEPH THEODORE ..... Pittsburgh
KAUFMAN, ABE JAMES ..... Pittsburgh
KELLEY, HARRY CHESTER ..... Wilmerding
KENNEDY, WILLIAM DEAN ..... Butler
KIBLER, EVERETT LAWRENCE ..... Lock No. 4
LANNON, WILLIAM CHARLES ..... Bridgeport
LASDAY, ISADORE ALLAN ..... Munhall
LAVICTOIRE, MISS FREDA ..... Jeannette
LESSIG, HARRY L. ..... Munhall
LEVINE, NATHAN ..... Pittsburgh
LEVY, JOSEPH ..... Pittsburgh
LORDON, CORNELIUS JOSEPH ..... Homestead
LUTZ, JOSEPH ALOYSIUS ..... Bridgeville
LYNAM, ARTHUR J. ..... Johnstown
MCBETH, GEORGE A. ..... McDonald
MCCLAIN, ROBERT DANIEL ..... Mt. Union
MCGINLEY, WAYNE L. ..... Waynesboro
MCQUONE, IRWIN WILLIAM ..... Pittsburgh
MANON, JOSEPH PAUL ..... Charleroi
MARKOWITZ, LOUIS ..... McKees Rocks
MATHEWSON, JOHN DONALD ..... Windber
MERRIMAN, RALPH GEORGE ..... Kane
MILLER, HOLMES TAYLOR ..... Irwin
MOFFITT, WILLIAM DURBIN ..... Pittsburgh
MOGILOWITZ, ABRAM ..... Oil City

Morrow, Stanley D. ..... Pittsburgh
Myers, William R. ..... Pittsburgh
Neff, Robert B. ..... Johnstown
Nowakowski, Stanley Felix ..... Pittsburgh
Nydes, Phillip C. ..... Pittsburgh
O'Donnell, James Raymond ..... Pittsburgh
Paul, Charles Edwin ..... South Fork
Procyk, John ..... Greensburg
Radzilowski, John M. ..... Donora
Ratner, Samuel ..... Pittsburgh
Rider, Charles A. ..... Benwood, W. Va.
Rosenthal, Emanuel ..... Pittsburgh
Roth, Walter George ..... Altoona
Schmalenbach, Herbert M. ..... East Pittsburgh
Schubert, August Charles ..... Ford City
Schwartz, Jacob Daniel ..... Pittsburgh
Seidel, Fred R. ..... Hazelton
Singer, Lewis Aaron ..... Pittsburgh
Steuer, Sylvester ..... Pittsburgh
Stone, William John ..... Beaver Falls
Taylor, John Frederick ..... Munhall
Urling, Lewis H. ..... Beaver
Virostek, Stephen Vincent ..... Braddock
Wampler, Joseph Kennedy ..... Boswell
Ward, Howard A. ..... Pittsburgh
Weightman, Lloyd Elsworth ..... Greensburg
Wicks, Dwight Barnett ..... Johnstown
Wilson, Herbert Sterrett ..... Wilmerding
York, Saul ..... Pittsburgh
Zimmerman, Paul Berkey ..... Johnstown

FRESHMAN CLASS—1919-1920

Ackerman, Samuel ..... Butler
Acklin, John M. ..... Parnassus
Austin, Alvin Saint Clair ..... Pittsburgh
Bailey, Roger S. ..... Titusville
Baker, Joseph Dewitt ..... Woodlawn
Baker, Lawrence White ..... Woodlawn
Bane, Albert Gallatin ..... Washington
Barlow, Carleton D. ..... Homestead
Barr, George William ..... Claysville
Baughman, Charles ..... Irwin
Bayne, Paul Benjamin ..... Kittanning
Beatty, Othello Ziegler ..... Butler
Bennett, Frank Adams ..... Mount Union

Birdseye, William Harvey	Turtle Creek
Blakemore, Marcus Peter	Pittsburgh
Bletzinger, Raymond Edward	Coraopolis
Blimmel, William J.	Johnstown
Bowers, Allen Raymond	Canonsburg
Bowman, Paul C.	Pittsburgh
Bowser, Randall C.	New Bethlehem
Boyer, Fred Robert	Evans City
Brann, Paul John	Canton
Bromelmeir, Ralph H.	Fort Wayne, Ind.
Brown, Charles Henry	Pittsburgh
Burnstein, Emanuel	McKeesport
Byers, Franklin E.	Turtle Creek
Camp, Harold R.	Sharon
Campbell, Harry Keith	Charleroi
Chain, G. Radnor	West Newton
Cohen, Frank	Pittsburgh
Cole, William Lucius	Pittsburgh
Cook, James Lowman	Irwin
Cook, Wesley R.	Pittsburgh
Cooper, Edgar P.	Patton
Cowan, Wallace Forrest	Vandergrift
Crouse, Harold M.	Stahlstown
Dankmeyer, Edward C.	Johnstown
Davis, Marion B.	Duquesne
Defibaugh, Ellis Roy	Wilkinsburg
Detar, Reed Le Roy	Oil City
Dickey, George Elliott	Tarentum
Diffenbacher, Victor Stratton	Pittsburgh
Diller, Du Bois	Lancaster
Dunegan, Harry John	Patton
Dunegan, Howard Michael	Patton
Elyanoff, Ben	Pittsburgh
Engle, Rollin George	Butler
Erny, Howard Anthony	Pittsburgh
Eselman, Jacob Clifton	Cresson
Eshelman, Thomas Austin	Franklin
Estep, Russell G.	Duquesne
Evans, Charles M.	Pittsburgh
Fagan, Roscoe G.	Altoona
Fehr, Vankirk Edwin	McKeesport
Feingold, Abe	Pittsburgh
Fichthorn, Robert Foltz	Manorville
Fleming, Edward F.	Kane
Foster, Morris	Pittsburgh

Francis, Matthew Henry	Latrobe
Freepurn, Harold Edgar	Johnstown
Friedman, Harry Meyer	Pittsburgh
Garbart, John Goodwin	Ingram
Gardner, Jesse Alter	Hoboken
Girt, Charles Henry	Elizabeth
Glick, Isadore	Hazelwood
Gold, Hosea Sylvester	Sagerstown
Goldstein, Charles	Pittsburgh
Goode, Plesent William	Mobile, Ala.
Grajewski, Frank B.	Pittsburgh
Greer, Lester Lamont	Canonsburg
Gross, Alexander Milton	Pittsburgh
Harmany, William Charles	Pittsburgh
Harrington, Gordon F.	Bentleyville
Harsch, N. E.	Olean, N. Y.
Hartman, Walter Herwald	Shippingport
Haugh, Frederick Gilbert	Pittsburgh
Healy, Patrick Sarsfield	Altoona
Heasley, Paul Wayne	Brookville
Heinle, Edward William	Natrona
Herring, Charles Paul	Derry
Herskowitz, William	Wilkinsburg
Hick, Thomas A.	Jamestown, N. Y.
Holland, Bailey Orlando	Hot Springs, Ark.
Holleran, Thomas Vincent	Pittsburgh
Humes, Harry A.	Torrance
Hunger, George A.	Vandergrift
Hutchinson, Austin Purves	Aspinwall
Irwin, James Kolton	Ingram
Johns, Hector David	Wilmerding
Johnston, Walter G.	Du Bois
Jones, Noah Byron	Charleroi
Kahle, S. C.	Knox
Kaplan, Edward	McKeesport
Keenan, James Russell	Carnegie
Keenan, William R.	Duquesne
Kelly, William Jennings	Cranberry
Kistler, Alan Aloysius	Pittsburgh
Knoer, William Albert	Pittsburgh
Kohlman, George V.	Oil City
Krause, Morris Gilbert	South Brownsville
Kunkle, Wilson George	Delmont
Lang, Charles Pugh	Aspinwall
Lathrop, Miss Claire Helen	Emporium

Ledden, Daniel Carlyle	Rochester, N. Y.
Lehner, John	Pittsburgh
Levine, Manuel Sherman	New Castle
Lightfoot, Harold William	Monessen
Little, Tibertius A.	Johnstown
Lloyd, Leslie Clair	Brisbin
Lukas, Edwin	Pittsburgh
Luke, Robert James	Morganza
Luthy, William Lloyd	Homestead
McClain, Fred Hunter	Mt. Union
McClaren, James	Rossiter
McCutcheon, Joseph Eugene	Elm Grove, W. Va.
McDivitt, Francis Charles	Greensburg
McDonald, Charles Paul	Du Bois
McDonnell, Francis R.	Pittsburgh
McGovern, Thornton Le Roy	Brockport
McLean, John J.	Homestead
McNerny, Daniel J., Jr.	Greensburg
MacNulty, David Jay	Wellsboro
Malcolm, James A.	Pittsburgh
Malloy, Francis Bernard	Duquesne
Marks, Harry	Pittsburgh
Marsh, Ralph Alphonse	Brookville
Mervis, D. Charles	Braddock
Miller, Herbert Lewellyn	Turtle Creek
Miller, Jonathan Franklin	Mt. Union
Mills, Kepler G.	California
Moats, Bliss M.	Jamestown
Monk, Theodore	Wilkinsburg
Moody, William Hawthorne	Pittsburgh
Morgan, Charles, Jr.	Sharon
Morgan, Charles Hays	McKeesport
Morgan, William Glynn	New Castle
Myers, Robert Palmer	Bellevue
Nauhaus, Jacob N.	Mars
Nebo, William Bowman	Pittsburgh
Nellis, Henry B.	Rochester, N. Y.
Nelson, Ray Charles	Martin
Norris, James L.	Homestead
Oartel, John Sheldon	Wilkinsburg
O'Connor, Charles F.	Pittsburgh
O'Donnell, Patrick Francis	Piedmont, W. Va.
O'Neal, Ira Donald	Uniontown
Ouderkirk, Miss S. Lou	Wilkinsburg
Passack, Carl Julius	Pittsburgh

Patterson, Orville Leroy ..... Sharon
Pearce, James Newton ..... Saltsburg
Perri, Frank Joseph ..... Donora
Pettler, Eugene ..... Beaver Falls
Pollitt, Robert Charles ..... Erie
Potts, Harry E. ..... Greensburg
Prickman, Wm. Robert, Jr. ..... Crafton
Purcell, Joseph Anthony ..... Erie
Rafalovitch, Samuel ..... Pittsburgh
Raffel, George ..... Pittsburgh
Rhodes, Harry R. ..... Corry
Rogers, Wyndham Louis ..... Pittsburgh
Rose, Earle A. ..... Leechburg
Rosenberg, Henry ..... Pittsburgh
Rossfield, Arthur William ..... Lima, O.
Rubenstein, Boris ..... Pittsburgh
Ruder, Ernest O. ..... Mt. Pleasant
Rumbel, William Harold ..... Sharon
Sachs, Simon ..... Pittsburgh
Sakmar, Joseph J. ..... Johnstown
Schafer, Nathan ..... Pittsburgh
Shaner, Floyd Lawrence ..... Canonsburg
Shoop, Victor ..... Freeport
Silverman, Max ..... Pittsburgh
Silverstein, David F. ..... Pittsburgh
Silves, Frank F. ..... Sligo
Singley, Walter Henry ..... Wilkinsburg
Smith, Robert Bruce ..... Rowlesburg, W. Va.
Smock, Uriel Kenneth ..... Meadville
Smoot, William Clifford ..... Pittsburgh
Snyder, Thoburn Rudolph ..... Vandergrift
Speer, John Francis Hunter ..... Crafton
Sposato, Nicholas Albert ..... Pittsburgh
Stein, Isadore Harvey ..... Pittsburgh
Sternberg, Frank ..... Pittsburgh
Stoner, Guy Ner ..... Louisville, O.
Storer, Charles Shaffer ..... Elizabeth
Swivel, Richard Earl ..... Huntingdon
Theodoropoulos, Spira ..... Braddock
Thompson, Edwin Homer ..... Bellevue
Thompson, Lony C. ..... West Alexander
Turner, Clair Plummer ..... Farrell
Unangst, Harry I. ..... Cochranton
Underwood, Francis Maxwell ..... Monongahela
Valinsky, Raymond H. ..... Pittsburgh

Veil, James F.	Punxsutawney
Wade, Walter F.	Edinboro
Walker, William Paul	Apollo
Walsh, Michael Francis	Pittsburgh
Watkins, Eugene L.	Johnstown
Westin, Victor Alexander	Turtle Creek
Wickerham, Ralph D.	Homestead
Wigley, Walter E.	Pittsburgh
Wolfe, Gaylord Emil	McKeesport
Yourd, Raymond Atchison	Carnegie
Zimmerman, Julius	Pittsburgh

GRADUATED DECEMBER 5, 1919
AS OF THE CLASS OF 1919

Amdur, Ben	Pittsburgh
Brett, George J.	Clearfield
Hantz, George F., Jr.	Greensburg
Highberger, Frederick	Greensburg
Jones, Fred Gilmore	Wilkinsburg
Kelly, Frank W.	Lake Carey
Lacock, Gideon Smitheman	Pittsburgh
Miller, Ralph Means	Pittsburgh
Morgan, James Michael	Homestead
Rubin, Morris	Pittsburgh
Schermer, Maurice	Farrell
Schwartz, Howard Maurice	Pittsburgh
Silvis, William Harold	New Bethlehem
Spencer, Lyman Wingate	Carbondale

OMICRON KAPPA UPSILON

Beta Chapter of the honorary dental fraternity was organized in 1915 and admits to membership those students of the senior class who rank highest in examinations and work during their entire course in college. This honor is limited to twelve per cent of the graduating class.

The following members of the 1920 class made O. K. U.:

William Fredin Swanson

Edmund B. Nagle, Jr.

OFFICERS OF THE DENTAL ALUMNI ASSOCIATION

J. G. Fitzhugh, '06	President
A. B. French, '13	Vice President
F. Charles Friesell, '98	Secretary and Treasurer
Howard Bock, '14	Corresponding Secretary

The Dental Alumni Association holds its annual meeting on the day preceding Commencement Day, in the Ampitheatre of the Dental School.

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